



A DOCPHOENIX

APPL PARTS



_____**371P**_____
PCT Papers in a 371 Application

_____**A...**_____
Amendment Including Elections

_____**ABST**_____
Abstract

_____**ADS**_____
Application Data Sheet

_____**AF/D**_____
Affidavit or Exhibit Received

_____**APPENDIX**_____
Appendix

_____**ARTIFACT**_____
Artifact

_____**BIB**_____
Bib Data Sheet

_____**CLM**_____
Claim

_____**COMPUTER**_____
Computer Program Listing

_____**CRFL**_____
All CRF Papers for Backfile

_____**DIST**_____
Terminal Disclaimer Filed

_____**DRW**_____
Drawings

_____**FOR01**_____
Foreign Reference

_____**FRPR**_____
Foreign Priority Papers

_____**IDS**_____
IDS Including 1449

_____**NPL01**_____
Non-Patent Literature

_____**OATH**_____
Oath or Declaration

_____**PET.**_____
Petition

_____**RETMAIL**_____
Mail Returned by USPS

_____**SEQLIST**_____
Sequence Listing

_____**SPEC**_____
Specification

_____**SPEC NO**_____
Specification Not in English

_____**TRNA**_____
Transmittal New Application

_____**CTNF**_____
Count Non-Final

_____**CTRS**_____
Count Restriction

_____**EXIN**_____
Examiner Interview

_____**M903**_____
DO/EO Acceptance

_____**M905**_____
DO/EO Missing Requirement

_____**NFDR**_____
Formal Drawing Required

_____**NOA**_____
Notice of Allowance

_____**PETDEC**_____
Petition Decision

OUTGOING



_____**1449**_____
Signed 1449

_____**892**_____
892

_____**ABN**_____
Abandonment

_____**APDEC**_____
Board of Appeals Decision

_____**APEA**_____
Examiner Answer

_____**CTAV**_____
Count Advisory Action

_____**CTEQ**_____
Count Ex parte Quayle

_____**CTFR**_____
Count Final Rejection

INCOMING

_____**AP.B**_____
Appeal Brief

_____**C.AD**_____
Change of Address

_____**N/AP**_____
Notice of Appeal

_____**PA..**_____
Change in Power of Attorney

_____**REM**_____
Applicant Remarks in Amendment

_____**XT/**_____
Extension of Time filed separate

Internal

_____**SRNT**_____
Examiner Search Notes

_____**WCLM**_____
Claim Worksheet

_____**CLMPTO**_____
PTO Prepared Complete Claim Set

_____**WFEE**_____
Fee Worksheet

File Wrapper

_____**FWCLM**_____
File Wrapper Claim

_____**IIFW**_____
File Wrapper Issue Information

_____**SRFW**_____
File Wrapper Search Info

BACKFILE DOCUMENT INDEX SHEET

Office Action Summary

Application No.
08/973,017

Applicant(s)

Leijon et al.

Examiner

Enad, Elvin

Group Art Unit
2834

☒ Responsive to communication(s) filed on Apr 10, 2000

☐ This action is **FINAL**.

☐ Since this application is in condition for allowance except for formal matters, **prosecution as to the merits is closed** in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11; 453 O.G. 213.

A shortened statutory period for response to this action is set to expire 3 month(s), or thirty days, whichever is longer, from the mailing date of this communication. Failure to respond within the period for response will cause the application to become abandoned. (35 U.S.C. § 133). Extensions of time may be obtained under the provisions of 37 CFR 1.136(a).

Disposition of Claims

☒ Claim(s) 1-4, 6-10, 12-35, 37, and 39-50 is/are pending in the application.

Of the above, claim(s) _____ is/are withdrawn from consideration.

☐ Claim(s) _____ is/are allowed.

☒ Claim(s) 1-4, 6-10, 12-35, 37, and 39-50 is/are rejected.

☐ Claim(s) _____ is/are objected to.

☐ Claims _____ are subject to restriction or election requirement.

Application Papers

☐ See the attached Notice of Draftsperson's Patent Drawing Review, PTO-948.

☐ The drawing(s) filed on _____ is/are objected to by the Examiner.

☐ The proposed drawing correction, filed on _____ is ☐ approved ☐ disapproved.

☐ The specification is objected to by the Examiner.

☐ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. § 119

☐ Acknowledgement is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d).

☐ All ☐ Some* ☐ None of the CERTIFIED copies of the priority documents have been

☐ received.

☐ received in Application No. (Series Code/Serial Number) _____

☐ received in this national stage application from the International Bureau (PCT Rule 17.2(a)).

*Certified copies not received: _____

☐ Acknowledgement is made of a claim for domestic priority under 35 U.S.C. § 119(e).

Attachment(s)

☒ Notice of References Cited, PTO-892

☐ Information Disclosure Statement(s), PTO-1449, Paper No(s). _____

☐ Interview Summary, PTO-413

☐ Notice of Draftsperson's Patent Drawing Review, PTO-948

☐ Notice of Informal Patent Application, PTO-152

--- SEE OFFICE ACTION ON THE FOLLOWING PAGES ---

Art Unit: 2834

DETAILED ACTION

1. Applicant's arguments with respect to claims 1-4,6-35,37 and 39-50 have been considered and found persuasive therefore the finality of that action is withdrawn.

Claim Rejections - 35 USC § 112

2. Claims 23,27,35,37,41 and 42 are rejected under 35 U.S.C. § 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

In claim 23, the limitation which recites the machine having "two or more poles" is unclear. Is this referring to the generator rotor or stator?

In regard to claim 27, the meaning of the rotor being "pronounced" is unclear.

In regard to independent claim 35, the beginning of the sentence with "The" should be replaced with ---A--- for clarity and proper format. See also claim 37.

In regard to claims 41 and 42, these claims are dependents of claim 39. If applicant desires to change their dependencies, then the proper format for amending the claims should be used.

Claim Rejections - 35 USC § 103

3. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Art Unit: 2834

4. Claims 1-4,6-8,10,12,21,31,32,34,35 and 37 are rejected under 35 U.S.C. § 103(a) as being unpatentable over Shildneck (USP 3,014,139) in view of Elton et al. (USP 5,036,165).

Shildneck discloses the claimed invention except for having a cable winding comprising of at least one semiconducting layer around the conductor. Shildneck discloses a direct cooled cable winding for an electromagnetic device such as a large turbine-driven generator.

Elton et al. teach that it is known to have an electrical cable comprising an internal grading layer of semi-conducting pyrolyzed glass fiber layer in electrical contact with the cable conductor. In another form of embodiment, Elton et al. teach an electrical cable provided with an exterior layer of internal grading layer of semi-conducting pyrolyzed glass fiber layer in contact with an exterior cable insulator with a predetermined reference potential.

It would have been obvious to one having ordinary skill in the art at the time the invention was made to have used the cable winding as taught by Elton et al. to the dynamoelectric machine of Shildneck since such a modification according to Elton et al. would prohibit the development of corona discharge.

5. In regard to forming the semiconducting layer with the same coefficient of thermal expansion to that of the insulation layer, it would have been obvious to one having ordinary skill in the art at the time the invention was made to have formed these layers with similar coefficients since it was known in the art that having the expansion rate of the two layers the same is desirable in order to prevent cracking of the insulation and rapid wear between the two.

Art Unit: 2834

6. Claims 9,13-20,30,33 and 39-49 are rejected under 35 U.S.C. § 103(a) as being unpatentable over Shildneck (USP 3,014,139) in view of Elton et al. (USP 5,036,165) and further in view of Takaoka et al. (USP 5,094,703) and German Patent Specification No. 468,827.

Shildneck and Elton et al. disclose the claimed invention except for having cable windings which consists of a plurality of strands having electrical conductors which are insulated and uninsulated. In addition, Elton et al. do not disclose having a stator comprising slot(s) consisting of a number of cylindrical openings separated by narrow waist parts.

Takaoka et al., as seen in figures 7,8,10 and 11 teach having a stranded conductor for an electrical cable comprising a combination of uninsulated stranded conductor and an insulated stranded conductor.

German Patent Specification No. 468,827 teaches that it is known to have a stator having cylindrical opening winding slots with decreasing radius in order to accommodate the winding conductors having varying diameters.

It would have been obvious to one having ordinary skill in the art at the time the invention was made to have used the teaching of Takaoka et al. having insulated and uninsulated electrical conductor strands and to have modified the device of Shildneck and Elton et al. since such a modification according to Takaoka et al. would reduce the amount of insulation needed and the number of electrical connections required in the end windings. Moreover, it would have been obvious to have used the stator slot arrangement as taught by German Patent Specification No.

Art Unit: 2834

468,827 since such an arrangement according to column 1, lines 25-29 would accommodate the conductors having varying diameters.

Conclusion

7. The prior art made of record and relied upon is considered pertinent to applicant's disclosure.
8. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Elvin Enad whose telephone number is (703) 308-7619. The examiner can normally be reached on Monday-Friday from 8:00AM to 4:00PM.
9. If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Nestor Ramirez, can be reached on (703) 308-1371. The fax phone number for this Tech Center is (703) 305-3431(32).

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the Group receptionist whose telephone number is (703) 308-0956.



Elvin Enad
Primary Examiner
Art Unit 2834
05.10.2000